NPDES Permit No. DC0000221

AUTHORIZATION TO DISCHARGE UNDER THE NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM MUNICIPAL SEPARATE STORM SEWER SYSTEM PERMIT

In compliance with the provisions of the Clean Water Act, 33 U.S.C. §§ 1251 et seg.

Government of the District of Columbia The John A. Wilson Building 1350 Pennsylvania Avenue, N.W. Washington, D.C. 20004

is authorized to discharge from all portions of the municipal separate storm sewer system owned and operated by the District of Columbia to receiving waters named:

Potomac River, Anacostia River, Rock Creek and stream segments tributary to each such water body

in accordance with the conditions set forth in Parts 1 through 8 herein.		
The issuance date of this permit is: November 20, 2023 .		
The effective date of this permit is: <u>December 20, 2023</u> .		
This permit and the authorization to discharge shall expire at midnight, on: <u>December 19, 2028</u>		
Signed this <u>20th</u> day of <u>November, 2023</u> .		

Catherine A. Libertz, Director Water Protection Division U.S. Environmental Protection Agency Region III

PERMIT FOR THE DISTRICT OF COLUMBIA MUNICIPAL SEPARATE STORM SEWER SYSTEM

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Part 1. DISCHARGES AUTHORIZED UNDER THIS PERMIT

1.1 MS4 Permit Area

This permit covers all areas within the jurisdictional boundary of the District of Columbia (DC or District) served by or contributing to discharges to, from, or through the Municipal Separate Storm Sewer System (MS4) owned or operated by the Government of the District of Columbia (the DC MS4) unless those areas have separate coverage under a National Pollutant Discharge Elimination System (NPDES) MS4 permit. Hereinafter these areas collectively are referred to as the "MS4 Permit Area".

1.2 <u>Permittee</u>

The "Permittee" is the Government of the District of Columbia. The Permittee has designated the District Department of Energy and Environment (DOEE) as the agency responsible for managing the MS4 Stormwater Management Program (SWMP). If the Permittee designates a different responsible agency, it must notify EPA in writing within one week.

1.3 <u>Authorized Discharges</u>

The receiving waters to which the Permittee is authorized to discharge are the Potomac River, Anacostia River, Rock Creek, and tributaries to each such waterbody.

This permit authorizes all stormwater point source discharges to waters of the United States to, from, and through the DC MS4 that comply with the requirements of this permit. This permit also authorizes the discharge to, from, and through the DC MS4 of stormwater commingled with flows contributed by process wastewater, non-process wastewater, stormwater associated with construction activity, or stormwater associated with industrial activity provided that the dischargers are authorized under separate NPDES permits or applicable federal and District regulations.

This permit also authorizes the following non-stormwater discharges to the DC MS4 but only when the specified conditions have been met: discharges resulting from clear water flows, roof drainage, dechlorinated water line flushing, landscape irrigation, ornamental fountains, diverted stream flows, rising ground waters, uncontaminated ground water infiltration to separate storm sewers, uncontaminated pumped ground water, discharges from potable water sources, foundation drains, air conditioning condensation, irrigation waters, springs, footing drains, lawn watering, individual resident car washing, flows from riparian habitats and wetlands, dechlorinated swimming pool discharges, and emergency firefighting activities. Such non-stormwater discharges to the MS4 are only authorized where: (1) appropriate stormwater activities and controls required by this permit have been applied; (2) such discharges are managed so that water quality is not further impaired; and (3) the requirements of the federal Clean Water Act, 33 U.S.C. §§ 1251 et seq. (CWA or Clean Water Act), and EPA regulations are met.

For any municipal activity associated with industrial activity, as defined by 40 C.F.R. § 122.26(b)(14), which discharges stormwater to, from, or through the DC MS4, the Permittee shall obtain separate coverage under either: (1) the EPA Multi-Sector General Permit for Stormwater Discharges Associated with Industrial Activity (MSGP); or (2) an individual NPDES permit.

1.4 Permittee Authorities and Obligations

1.4.1 Permittee Legal Authority

The Permittee shall use its existing legal authority to control discharges to and from the MS4 to prevent or reduce the discharge of pollutants to achieve water quality objectives, including but not limited to, applicable water quality standards, and all provisions of this permit.

1.4.2 Permittee Laws, Regulations, and Ordinances

The Permittee shall review and revise, where applicable, building, health, road and transportation, and other codes, standard operating procedures, regulations, and ordinances to remove barriers to, and to facilitate the implementation of the following: (1) standards resulting from issuance and implementation of District stormwater regulations; and (2) performance standards and other requirements of this permit.

Nothing in this permit shall be construed to preclude the institution of any legal action or to relieve the Permittee from any responsibilities, liabilities, or penalties established pursuant to any applicable District law, regulation, or ordinance identified herein. In the case of "exemptions and waivers" or other exceptions to coverage under District law, regulation, or ordinance, Federal law and regulation shall be controlling.

1.4.3 Permittee Fiscal Resources

The Permittee shall provide sufficient finances, staff, equipment, and support capabilities to implement the provisions of this permit, including, but not limited to, the SWMP required herein. Lack of funding does not constitute a justification for non-compliance with the terms of this permit.

1.5 <u>Discharge Limits</u>

The Permittee must manage, implement, and enforce a SWMP in accordance with the Clean Water Act and corresponding stormwater NPDES regulations, 40 C.F.R. Part 122, to meet the following permit requirements:

- 1.5.1 Effectively prohibit non-stormwater discharges to, from, and through the MS4, except those authorized by Section 1.3 of this permit and/or those authorized by another NPDES permit.
- 1.5.2 Effectively prohibit pollutants in stormwater discharges or other unauthorized discharges to, from, and through the MS4 as necessary to comply with existing District of Columbia Water Quality Standards (DCWQS).
- 1.5.3 Attain applicable wasteload allocations (WLAs) for each Total Maximum Daily Load (TMDL) established or approved by EPA for each receiving water body consistent with federal requirements at 33 U.S.C. § 1342(p)(3)(B)(iii) and 40 C.F.R. § 122.44(k)(2)-(3) by achieving the following collective numeric WLA attainment milestones established as limits for this permit term.
- 1.5.3.1 A total number of 1,175 Acres Managed, per the definition in Part 8, shall be attained by the end of this five-year permit term in the MS4 Permit Area, above and beyond what has already been implemented in the MS4 Permit Area on the effective date of this permit. This metric is designed to achieve a collective reduction in all TMDL pollutants of concern in stormwater other than trash, per the retention requirements of Sections 3.1 and 3.2 of this permit.

A certain number of the total 1,175 Acres Managed must be located in each of the three major river basins in the MS4 Permit Area, as listed below in Table 1. The remaining 588 Acres Managed can be located in any of those major basins. In addition, at least 175 of the total 1,175 Acres Managed must be located in Public Rights-of-Way (PROWs) in the MS4 Permit Area, though these 175 Acres Managed need not be located in any specific major basin.

TABLE 1
Numeric Limits in Acres Managed for this Permit Term

Major Basin	5-Year Limits
	(Acres Managed)
Anacostia River	353
Potomac River	131
Rock Creek	103
Anywhere in the MS4	E00
Permit Area	588
Total	1,175

1.5.3.2 The Permittee shall achieve a minimum net increase of 38,850 trees in the MS4 Permit Area by the end of this five-year permit term. The Permittee shall use a benchmark annual average tree planting rate of 7,770 plantings within the MS4 Permit Area. In addition to the specific requirement in this permit to track the number of trees planted, the Permittee shall

also translate the number of trees planted to Acres Managed, using the Permittee's assigned retention values.

- 1.5.3.3 108,347 pounds of trash shall be captured, removed, or prevented from entering the Anacostia River within the MS4 Permit Area annually per the requirements of Subsection 3.7.1 of this permit.
- 1.5.4 Comply with all other provisions and requirements contained in this permit, and in plans, schedules, and other deliverables required by this permit.

1.6 Compliance Framework

Compliance with all provisions contained in this permit, including permit limits and final dates for the attainment of applicable TMDL WLAs, shall constitute adequate progress toward compliance with DCWQS and WLAs for this permit term.

Part 2. STORMWATER MANAGEMENT PROGRAM PLANNING

2.1 Elements of the Stormwater Management Program (SWMP)

EPA has reviewed the updated SWMP Plan required as part of the application for this permit and has determined that the strategies, initiatives, schedules, actions, and programs that are elements of the plan will reduce the discharge of pollutants to the maximum extent practicable for this permit term and has incorporated those elements, where appropriate, into this permit.

The Permittee shall continue to implement, assess, and maintain all controls, procedures, and control measures required by this permit. The Permittee shall ensure that updates to plans and strategies are consistent with all compliance requirements and deadlines contained in this permit. The Permittee shall post current versions of all plans that comprise the SWMP on its website at an easily identifiable location.

2.2 <u>Total Maximum Daily Load (TMDL) Planning</u>

2.2.1 Maintaining and Refining TMDL Databases and Modeling Tools

The Permittee shall continue to update the *Consolidated TMDL Implementation Plan* modeling tool and associated databases, which shall be used in the development of revised plans, schedules, or strategies. The modeling tool and/or associated databases shall also be used to provide consistent tracking of progress against milestones and benchmarks. Milestone and benchmark progress shall be included in each year's Annual Report for effective utilization by multiple audiences, including the public.

2.2.2 Milestones and Benchmarks for the Next Permit Term

2.2.2.1 When the Permittee updates the *Consolidated TMDL Implementation Plan* per Section 2.2.5.4, the Permittee shall use information from the results of the Bacteria Source Tracking studies that were undertaken by the Permittee during the previous permit term and/or are currently ongoing, as well as results of the activities undertaken in Section 4.5.2.

While the Permittee may opt to revise existing TMDLs, pursuant to Subsection 2.2.5.2 of this permit, milestones and benchmarks must be developed and implemented, as relevant, for existing WLAs until such time as a revised TMDL is approved. As appropriate, efforts to abate high priority sources of bacteria can begin immediately and need not await public notice and comment on any revised TMDL nor EPA review of an updated *Consolidated TMDL Implementation Plan*. Consistent with Subsection 2.2.5.4 of this permit, the Permittee shall incorporate new milestones and benchmarks into the revised *Consolidated TMDL Implementation Plan*, as appropriate.

- 2.2.2.2 When the Permittee updates the *Consolidated TMDL Implementation Plan* per Section 2.2.5.4, the Permittee shall use the information gathered as a result of the investigation into certain toxic pollutants during the previous permit term (see Draft *Investigations of Ongoing MS4 Toxic Contaminants to the Anacostia River*) as a means to develop new milestones and benchmarks for implementing controls to attain relevant MS4 WLAs for toxic pollutants. Consistent with Subsection 2.2.5.4 of this permit, the Permittee shall incorporate new milestones and benchmarks into the revised *Consolidated TMDL Implementation Plan*, as appropriate.
- 2.2.2.3 The Permittee shall utilize the District BMP Opportunity Assessment¹ as part of its future TMDL planning efforts to identify future projects to assist in attaining MS4 WLAs. Consistent with Subsection 2.2.5.4 of this permit, the Permittee shall incorporate any new information gained from this Assessment into the revised *Consolidated TMDL Implementation Plan*.

2.2.3 Stormwater Fee Status Update

The Permittee shall submit to EPA with the 2025 Annual Report an update on the status of the District's Stormwater Fee for achieving the water quality goals of the permit.

2.2.4 Updating Stormwater Management Regulations

2.2.4.1 The Permittee shall publish in the DC Register proposed updates to its existing stormwater management regulations based upon those opportunities identified in the 2022 Consolidated TMDL Implementation Plan, as feasible dependent upon obtaining pre-clearance

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https://storymaps.arcgis.com/stories/c2e9bd50e03c4e089f35073e0113edf7

for the proposal. The areas identified include lowering the threshold for regulated projects through the adoption of small area regulations and/or revising the peak discharge requirements to better prepare for the increased frequency of large storms due to climate change. If clearance is obtained, the regulations shall be proposed no later than four years from the effective date of the permit and reflected in the subsequent Annual Report.

- 2.2.4.2 As part of the process for adopting changes to the stormwater management regulations, the Permittee shall develop an implementation strategy that includes public outreach, as well as a schedule for completion that may include phasing and other variables.
- 2.2.4.3 No later than three years from the effective date of the permit, the Permittee shall submit to EPA a detailed analysis (in the form of a study/plan/report, etc.) as to the effect that increasing the current 1.2" retention standard to 2" would have on water quality improvements and time to achieve WLAs . The study shall consider cost compared to the environmental benefit to be realized. This analysis shall build upon the description provided in the attachment to the 2020 Annual Report.
 - 2.2.5 Updating the Consolidated TMDL Implementation Plan
- 2.2.5.1 The Permittee shall update the *Consolidated TMDL Implementation Plan* to incorporate any new or revised TMDL, as approved or established by EPA, to include:
 - a. A specified schedule for attainment of WLAs that includes final attainment dates and, where applicable, interim milestones and numeric benchmarks.
 - i. Numeric benchmarks shall specify annual pollutant load reductions and the extent of control actions to achieve these numeric benchmarks.
 - ii. Interim milestones shall be included where final attainment of applicable WLAs requires more than five years. Milestone intervals shall be as frequent as possible but shall in no case be greater than five (5) years.
 - b. Demonstration using modeling of how each applicable WLA shall be attained using the chosen controls, by the date for ultimate attainment.
 - c. An associated narrative providing an explanation for the schedules and controls included in the *Consolidated TMDL Implementation Plan*.
- 2.2.5.2 Unless and until an applicable TMDL is no longer in effect (*e.g.*, withdrawn, reissued, or the receiving water is delisted), the *Consolidated TMDL Implementation Plan* must include all elements of Subsection 2.2.5.1 of this permit for each TMDL as approved or established by EPA.

- 2.2.5.3 Should implementation fall short of any milestone stipulated in this permit, the Permittee shall make appropriate revisions to the *Consolidated TMDL Implementation Plan* and begin implementing the revised Plan within 6 months, unless EPA approves a written request from the Permittee for a different schedule. The revised Plan shall include a description and implementation schedule for the additional controls to achieve the missed milestone(s). The entire Plan need not be submitted to EPA, only the relevant portions related to adaptive management for missed milestones.
- 2.2.5.4 As new information (including the results of studies and assessments required in this permit, data on performance of stormwater control measures, improved pollutant estimates, or construction schedules) informs refinement of benchmarks and milestones, the Permittee shall incorporate that new information into the updated *Consolidated TMDL Implementation Plan* such that the timeliest information is available for public notice and submittal to EPA per Subsection 2.2.5.5 of this permit, and for incorporation into the subsequent permit.
- 2.2.5.5 No later than fifteen (15) months prior to the expiration date of this permit, the Permittee shall make available for public notice and comment a fully updated *Consolidated TMDL Implementation Plan* addressing all the elements required in this permit. No later than 270 days (9 months) prior to the expiration date of this permit, the Permittee shall submit to EPA the fully updated *Consolidated TMDL Implementation Plan* for review, as part of the application package for permit renewal in Section 2.8 of this permit.

2.3 <u>Inspection Program for Regulated On-site and Off-site Control Measures</u>

The Permittee shall maintain and implement the Self-Inspection Self-Reporting (SISR) program for regular inspections of all regulated on-site and off-site stormwater control measures. The Permittee shall maintain adequate staff to review SISR application submittals and establish legal mechanisms to ensure that return to compliance happens expeditiously for all stormwater control measures that are no longer in place or no longer function per design.

2.4 Public Right-of-Way (PROW) Optimal Design

The Permittee, considering project scope and site suitability, shall utilize the standard designs for green infrastructure developed by DDOT for all DDOT PROW projects (excluding capital improvement projects) to increase the installation of green infrastructure in the MS4 Permit Area.

2.5 Evaluation of Pollutant Reductions from Other Activities

2.5.1 Catch Basin Cleaning and Mobile Data Collection

2.5.1.1 As it cleans catch basins, the Permittee shall continue utilizing its standard mobile application to track and estimate the percent volume filled by debris for catch basins cleaned

according to the process outlined in DOEE's Standard Operating Procedure for Data Collection, Processing, and Reporting for Catch Basin Cleaning Operations, updated as appropriate.²

- 2.5.1.2 The Permittee shall use the data collected as part of its catch basin cleaning effort to estimate the amount of anticipated pollutant reductions achieved resulting from the cleaning program.
- 2.5.1.3 The Permittee shall include information from both 2.5.1.1 and 2.5.1.2 in its Annual Report.

2.5.2 Other Controls or Management Measures

At any time during this permit term, the Permittee may submit to EPA for review a method for estimating pollutant reductions from any activity that prevents, reduces, or removes pollutants from stormwater discharges to receiving waters. The method may include an equivalency translation to "Acres Managed", if appropriate, or may express the reduction in pounds, colonies per liter, or another appropriate metric.

2.6 <u>Alternatives for Ice and Snow Management</u>

The Permittee shall continue to implement the pilot program to test the alternative calcium magnesium acetate treatment that the Permittee began during the last permit term. The pilot shall be run during the first two years of the permit term with results to be submitted to EPA with the 2025 Annual Report. Any updates/changes in alternative treatments and/or measures as a result of the pilot outcome that are included in the District Snow and Ice Removal Plan shall also be included in the 2025 Annual Report. Any changes made to snow and ice management having the potential to impact stormwater pollution prevention shall be included in the updated SWMP Plan required per Section 2.9 of this permit.

2.7 <u>Flood Management for Water Quality</u>

The Permittee shall implement the activities below to ensure that flood management projects assess the impacts of flooding on the quality of receiving water bodies and ensure that flood management projects control discharges of pollutants to, from, and through the MS4.

2.7.1 By the end of the permit term, the Permittee shall:

2.7.1.1 Develop a comprehensive integrated flood model to show how coastal, riverine, and inland flooding interact, and to identify areas of the District that are more

² DOEE's Standard Operating Procedure for Data Collection, Processing, and Reporting for Catch Basin Cleaning Operations is based upon prior inspection and maintenance activities and was included as an attachment to the SWMP Plan that was submitted with the permit application.

susceptible to flooding;

- 2.7.1.2 Identify actions for areas of high flood risk that could minimize the water quality impacts of a flood event on receiving water bodies; and
- 2.7.1.3 Identify areas of highest risk for impacts on water quality due to flooding as candidates for the development of stormwater management plans.
- 2.7.2 No later than two years from the effective date of the permit, the Permittee shall complete the development of the FloodSmart Homes Program. Once completed, the permittee shall report annually on the number of homes enrolled in the program.

2.8 Submittals to EPA

The Permittee shall submit SWMP strategies, elements, initiatives and plans to EPA for review and approval according to the schedule in Table 2 below, including providing elements for public comment as indicated in the table.

TABLE 2 SWMP Elements to be submitted to EPA and/or to Public Notice

Element	Deadline for Submittal to EPA	Subject to EPA Approval *	Subject to Formal Public Notice and Comment **
New Planning or Assessment I	Requirement		
Water Quality Assessment Program QAPP (4.3.1.1)	One year from permit effective date	No	No
Rapid Stream Assessment Program QAPP (4.3)	One year from permit effective date	No	No
Stormwater Fee Status Update (2.2.3)	With the 2025 Annual Report	No	No
Proposed Updates to the Stormwater Regulations (2.2.4)	Four years from permit effective date	No ³	Yes
Analysis of 2" Retention Standard (2.2.4.3)	Three years from permit effective date	No	No
Program for Inspection and Clean out of Piping Infrastructure (3.3.6)	Four years from permit effective date	No	No
Alternatives for Ice and Snow	With the 2025 Annual	No	No

³ EPA, as the NPDES Permitting Authority, does have the ability to review proposed regulatory updates as part of its CWA oversight role.

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Management (2.6)	Report		
Comprehensive Flood Model	By the end of the	NI -	NI -
(2.7.1.1)	permit term	No	No
Identification of actions to minimize impacts of flood events (2.7.1.2)	By the end of the permit term	No	No
Identification of high-risk flood areas (2.7.1.3)	By the end of the permit term	No	Yes
FloodSmart Homes Program (2.7.2)	Two years from permit effective date	No	No
Strategy to support diversity, equity, and inclusion into CWA objectives (7.3.2)	December 1, 2027	No	Yes
Regular Reporting			
Discharge Monitoring Reports (5.1)	Annually via NetDMR	No, but EPA will review for	No
Annual Reporting to EPA (5.2)	No later than December 1 of each year beginning in 2023.	permit compliance and may request changes to the program if warranted.	No
MS4 Annual Report Story Map (5.3.1)	Two months after Annual Report submittal	No	No
Updated Strategies/Plans	I	l	
Updated Consolidated TMDL Implementation Plan (2.2.5)	270 days before permit expiration date	Yes, but not every time it's updated; only as a part of the SWMP package requesting permit renewal.	Yes, 15 months prior to permit expiration date
Updated SWMP Plan (2.9)	270 days before permit expiration date	Yes, as part of the SWMP package requesting permit renewal	Yes, 18 months prior to permit expiration date

Permit Application for Renewal			
MS4 Permit Application	270 days before	No, but EPA	
(2.10)	permit expiration	reviews for	No
	date	completeness	

^{*} EPA may choose to comment on any of these plans or assessments.

2.9 Updated SWMP Plan for the Next Permit Term

No later than eighteen (18) months prior to the expiration date of this permit, the Permittee shall make available for public notice and comment a fully updated SWMP Plan addressing all the elements required in this permit. The updated SWMP Plan shall be informed by planning elements of Part 2, implementation efforts in Part 3, and water quality assessments in Part 4 of this permit. No later than 270 days (9 months) prior to the expiration date of this permit the Permittee shall submit to EPA the fully updated plan for review and approval, as part of the application package for permit renewal.

2.10 Application for the Next Permit Term

The Permittee shall develop a permit application based on the findings presented in each of the annual reports submitted during the permitting cycle, and on any feedback received from EPA and the public. The permit application package must be submitted to EPA no later than 270 days (9 months) prior to the expiration date of this permit. The permit application package, which includes the updated SWMP Plan (Section 2.9) and the updated *Consolidated TMDL Implementation Plan* (Section 2.2.5), shall propose the next iterative set of objectives for the program and provide an analysis to demonstrate that these objectives are able to be achieved in the subsequent permit term.

If EPA makes available an electronic MS4 application form at least six months prior to the renewal application submittal date (15 months prior to the permit expiration date), the Permittee shall use the electronic mechanism and process developed by EPA to submit the renewal application.

Part 3. <u>STORMWATER MANAGEMENT PROGRAM IMPLEMENTATION</u>

3.1 <u>Implementing Part 3 of the Permit</u>

Part 3 describes the programs that the Permittee is required to maintain to achieve pollutant reductions, demonstrate progress toward achieving applicable TMDL WLAs, and meet other Clean Water Act objectives. Section 3.2 contains programs for which the Permittee maintains a metric for translating pollutant reductions into Acres Managed. Sections 3.3 through 3.7 are programs and practices for which pollutant reductions will be tracked and measured using alternative methods. All of these programs are in place to ultimately reduce pollutant discharges to, from, and through the MS4. If, at any time during the permit term, the Permittee

^{**} The Permittee shall make all of these plans and assessments available on its website.

develops a new method for estimating pollutant reductions from any activity that prevents or reduces pollutant discharges, it must submit that new method to EPA as required by Subsection 2.5.2.

3.2 <u>Achievement of the Acres Managed Numeric Limit</u>

3.2.1 Accountability for Retention Measures

The Permittee shall continue to develop, implement, and enforce a program in accordance with this permit that integrates stormwater control measures at the site, neighborhood, and watershed levels within the MS4 Permit Area that shall be designed to mimic pre-development site hydrology using on-site stormwater retention measures (e.g., harvest and use, infiltration and evapotranspiration), policies, regulations, ordinances, and incentive programs.

- 3.2.1.1 The Permittee shall annually post on its website the status of all projects required to comply with the stormwater management regulations, including the total performance volume calculated for the project, the amount of stormwater retention volume achieved on-site, the amount of stormwater retention volume achieved off-site, and the compliance status of each project with an off-site retention volume.
- 3.2.1.2 The Permittee shall continue to maintain a formal process for site plan reviews and a post-construction verification process (*e.g.*, inspections, submittal of as-builts) to ensure that standards are appropriately implemented.
- 3.2.1.3 The Permittee shall maintain a database to track plan review, inspection, and the on-site and off-site retention performance of each project subject to this requirement. For projects using off-site retention, the compliance status of those projects with their off-site retention volume shall also be tracked.
 - 3.2.2 Implementing the Standard for Development and Redevelopment for Projects Greater than or Equal to 5,000 Square Feet

The Permittee shall continue to require the design, construction and maintenance of stormwater controls to achieve on-site retention of 1.2" of stormwater from a 24-hour storm with a 72-hour antecedent dry period through evapotranspiration, infiltration and/or stormwater harvesting and use for all public and private development and redevelopment projects that disturb greater than or equal to 5,000 square feet of land area. This requirement shall continue to be implemented in concert with the off-site mitigation program to compensate for any portion of the 1.2" volume to be retained off-site (Stormwater Retention Credits, see Subsection 3.2.3).

3.2.3 Stormwater Retention Credit Program

- 3.2.3.1 In order to provide for flexibility for those development projects that may not be capable of retaining 1.2" of stormwater runoff on-site, the Permittee shall continue to implement the Stormwater Retention Credit (SRC) off-site mitigation program.
- 3.2.3.2 The Permittee shall continue to implement the SRC Price Lock Program and SRC Aggregator Program, which incentivize the installation of voluntary green infrastructure BMPs in the MS4 Permit Area and help improve water quality outcomes.

3.2.4 Implementing the Standard for Projects in the Public Right-of-Way

The Permittee shall continue to implement a methodical analysis and decision process for projects in public rights-of-way (PROWs) in order to ensure that the project has exhausted every opportunity to achieve the "maximum extent practicable" ⁴ (as defined in the District stormwater regulations) on-site stormwater retention volume (SWRv). These projects need not conduct off-site mitigation or purchase SRCs. However, these projects are subject to design and site plan review requirements to ensure "maximum extent practicable" combinations of on-site SWRv, water quality treatment, and design options, including in some situations stormwater management of more than the 1.2" retention volume.

Each process shall follow the six design steps described in Appendix B of the District's 2020 Stormwater Management Guidebook, available at https://doee.dc.gov/swguidebook. In order to take advantage of opportunities for optimum stormwater management, these projects may include non-PROW areas that are disturbed as a part of the reconstruction of existing PROW or to allow pedestrian access alongside existing PROW. These projects shall be posted on the Permittee's website, per the requirements of Subsection 3.2.1.1 of this permit.

3.2.5 Implementing the Standard for Substantial Improvement Projects

The Permittee shall continue to require the design, construction and maintenance of stormwater controls to achieve on-site retention of 0.8" of stormwater from a 24-hour storm with a 72-hour antecedent dry period through evapotranspiration, infiltration and/or stormwater harvesting and use for all development projects where less than 5,000 square feet of soil is disturbed, but where the combined footprint of improved building and land-disturbing activities is greater than or equal to 5,000 square feet and which are undergoing substantial improvement. "Substantial improvement," consistent with District regulations at 21 DCMR § 599, means any repair, alteration, addition, or improvement of a building or structure, the cost of which equals or exceeds 50 percent of the market value of the structure before the improvement or repair is started. The Permittee may allow a portion of the 0.8" volume to be

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 $[\]frac{^4https://doee.dc.gov/sites/default/files/dc/sites/ddoe/publication/attachments/Appendix\%20B\%20MEP\%20Process\%20for\%20Existing\%20PROW.pdf$

compensated for in an off-site mitigation program consistent with the requirements of Subsection 3.2.3 of this permit.

3.2.6 Stormwater Management Guidebook

The Permittee shall continue to improve and implement the 2020 *Stormwater Management Guidebook* (available at https://doee.dc.gov/swguidebook) for use by land use planners and developers for all projects addressed by this permit, to include up-to-date objectives and specifications for integration of stormwater management technologies, including on-site retention practices.

3.2.7 Green Area Ratio Program

The Permittee shall continue to implement and refine the Green Area Ratio program to improve stormwater management in the MS4 Permit Area while allowing flexibility for developers and designers to meet development standards. The Green Area Ratio Program shall continue to use a scoring system to encourage green technology practices. This shall be achieved through zoning requirements.

3.2.8 Tree Planting

The annual total tree planting required in Subsection 1.5.3.2 (7,700) shall be calculated as a net increase, such that annual mortality or other loss is also included in the calculation. The Permittee shall ensure that trees are planted and maintained to achieve optimal stormwater retention and tree survival rate. Trees shall be planted in accordance with the Planting Specifications issued by the International Society of Arboriculture as appropriate to the site conditions.

3.2.9 RiverSmart Programs

The Permittee shall continue to implement and refine its suite of RiverSmart programs (Homes; Communities; Schools; Rebates; Targeted Watersheds). These voluntary on-site retention projects are not subject to the 1.2" on-site retention requirement, but they may be used to generate SRCs if they otherwise meet all the requirements for SRCs per Subsections 3.2.1.1 and 3.2.1.3 of this permit, and the District's stormwater regulations.

3.2.10 Stream, Buffer and Floodplain Restoration

The Permittee may take credit for pollutant reductions from stream, buffer or floodplain restoration activities where stream bed load or bank erosion contributes to the nutrient, total suspended solids (TSS) or sediment load in that stream. The credit towards the Acres Managed metric must be aligned with the memo "Proposed Methodology for Calculating an Equivalent Area Managed for Stream Restoration Projects" that was submitted to and approved by EPA in November 2021.

3.2.11 Priority Watershed Projects

During this permit term, the Permittee shall implement two (2) projects per year in any of the priority watersheds that were identified in the 2022 *Consolidated TMDL Implementation Plan* and can be found on DOEE's map viewer⁵. The type of local projects/activities identified in the *Consolidated TMDL Implementation Plan* to be considered may include installation of practices upland of stream restoration sites, projects that reduce multiple TMDL pollutants, and projects that address areas with assets vulnerable to flooding and extreme heat events associated with climate change.

If any updates/revisions to the priority watershed list occur during the permit term, they shall be added to the *Consolidated TMDL Implementation Plan* so that projects located in those newly identified areas can be considered for compliance with this section.

3.3 <u>Municipal Operations</u>

3.3.1 Response to Sanitary Sewer Overflow to the MS4

The Permittee shall continue to implement an effective response protocol for overflows of the sanitary sewer system to, from, or through the MS4. The response protocol shall clearly identify District agencies, departments, and authorities responsible for implementing each element of the protocol, and appropriate contact information. The response protocol shall contain procedures for:

- 1. Investigating any complaints of a sanitary sewer overflow (SSO) to, from, or through the MS4 within 24 hours of the incident report.
- 2. Responding to SSOs to the MS4 with containment or other appropriate measures within two hours of the Permittee discovering or confirming such an SSO.
- 3. Notifying appropriate sewer and public health agencies within two hours of the Permittee discovering or confirming an SSO to, from, or through the MS4.
- 4. Notifying the public in a timely and effective manner when an SSO to, from, or through the MS4 may adversely affect public health.

This provision in no way authorizes SSOs to, from, or through the MS4.

3.3.2 Industrial Activities at Municipal Operations

3.3.2.1 The Permittee shall ensure that stormwater pollution prevention measures are installed at all District-owned or leased facilities and job sites within the MS4 Permit Area where industrial activities occur or are considered "critical sources", as that term is defined at Part 8 of this permit. For operations that are being leased by third parties that currently have inadequate

⁵https://dcgis.maps.arcgis.com/apps/webappviewer/index.html?id=d872faed1f8642d190c45befed97c760

stormwater pollution prevention measures, a requirement to implement and maintain them must be included in lease agreements as they are established or renewed. For any operation with coverage under the EPA MSGP or an individual NPDES permit, the provisions of the MSGP or individual NPDES permit supersede the requirements of this provision.

- 3.3.2.2 The Permittee shall ensure that Stormwater Pollution Prevention Plans (SWPPPs) are created and/or regularly updated for District-owned, operated, and leased facilities and all job sites within the MS4 Permit Area where industrial activities occur that could contribute to stormwater pollution, including vehicle maintenance and fueling, storage and washing, or material storage. SWPPPs shall contain the following information as relevant to such facilities:
 - a. Primary contacts at the facility and/or contacts for the site's pollution prevention team:
 - b. Description of activities and physical attributes of the exterior elements of the site, including a site map;
 - c. Summary of potential pollutant sources, including spills and leaks and salt storage;
 - Description of the control measures used to mitigate stormwater pollution, including good housekeeping, maintenance, material management, spill prevention and response, erosion and sediment control measures, and employee training; and
 - e. Description of the schedules and procedures for implementing stormwater control measures, inspecting the site, and assessing and monitoring pollutants in stormwater discharging from the site.
- 3.3.2.3 The Permittee shall ensure that facilities with SWPPPs conduct quarterly self-inspections, with more frequent inspections for facilities with high levels and likelihood of contributing to stormwater pollution. Inspections shall consist of, at minimum, walking the site to investigate potential sources of pollution and completing a facility checklist.
- 3.3.2.4 For wash water at District-owned and operated facilities the Permittee shall eliminate discharges of pollutants to, from, and through the MS4 by implementing any of the following measures: 1) collect and haul off-site for disposal; 2) equip with a pre-treatment device; or 3) redirect to the sanitary sewer in accordance with District regulations and requirements. Wash water includes water from washing vehicles and equipment, water from washing building exteriors when it contains soap and other pollutants, and wash water used in the interior of buildings.
- 3.3.2.5 The Permittee shall annually perform inspection, maintenance, and repair of stormwater controls at District-owned or operated facilities, including green infrastructure, filtration and separation systems, and stormwater storage structures, consistent with the schedules in the SWPPPs.

- 3.3.2.6 The Permittee shall maintain a database inventory of all municipal operations that conduct industrial activities or are considered critical sources and provide such inventory to EPA upon request.
- 3.3.2.7 The Permittee shall retain records, as part of the database system, to demonstrate compliance with the requirements of Subsection 3.3.2 of this permit. Records shall be maintained for employee training, inspections and follow-up, spills and major leaks, and contracts used to implement stormwater control measures, monitor stormwater, and provide regular maintenance of control measures.
 - 3.3.3 Pesticide, Herbicide, and Fertilizer Use
- 3.3.3.1 The Permittee shall continue to implement control measures to manage pollutant discharges associated with the storage and application of pesticides, fertilizers, herbicides, the use of toxic substances, and runoff from landscape irrigation according to an integrated pest management (IPM) Program for those facilities governed by the District IPM regulations within the MS4 Permit Area. The IPM Program shall be an ecosystem-based strategy that focuses on long-term prevention of pests or their damage through a combination of techniques such as biological control, habitat manipulation, modification of cultural practices, use of resistant varieties, and use of low or no chemical and irrigation input landscapes, in accordance with the provisions of this permit, procedures and practices described in the SWMP and applicable regulations.
- 3.3.3.2 The Permittee shall continue to utilize IPM controls to reduce pollutants related to the storage and application of pesticides, herbicides, and fertilizers applied by its employees, contractors or agents in those areas governed by the District IPM regulations within the MS4 Permit Area.
 - a. Pesticides and herbicides are used only if monitoring indicates that they are needed according to established guidelines;
 - b. Fertilizers are used only when soil tests indicate that they are necessary, and only in minimum amounts and for needed purposes (e.g., seed germination);
 - Treatments are made with the purpose of removing only the target organism;
 - d. Pest controls are selected and applied in a manner that minimizes risks to human health, beneficial non-target organisms, and the environment;
 - e. No pesticides, herbicides, or fertilizers are applied to an area immediately prior to an expected rain event as defined in Part 4, or during or immediately following a rain event, or when water is flowing off the area;
 - f. No banned or unregistered pesticides or herbicides are stored or applied;
 - g. All staff applying pesticides or herbicides are certified or are under the direct supervision of a pesticide or herbicide applicator certified in the appropriate category;

- Procedures are implemented to encourage the retention and planting of native and/or non-invasive, naturalized vegetation to reduce water, pesticide, herbicide, and fertilizer needs;
- Pesticides, herbicides, and fertilizers are stored indoors or under cover on paved surfaces or enclosed in secondary containment and storage areas inspected regularly to reduce the potential for spills; and
- j. Landscapes that maximize on-site retention of stormwater, while minimizing mowing, chemical inputs, and irrigation are given preference for all new landscape installations.
- 3.3.3.3 The Permittee shall continue to use Geographic Information System (GIS) layers showing public land and sewersheds, as well as background data, to identify priority areas for a targeted strategy to reduce the sources of pesticides, herbicides, and fertilizers that contaminate the stormwater runoff to, from, and through the MS4.

3.3.4 Catch Basin Operation and Maintenance

- 3.3.4.1 The Permittee shall continue to operate a catch basin maintenance program that ensures that each catch basin within the MS4 Permit Area is inspected annually. If, upon inspection, a catch basin is found to require cleaning, the Permittee shall clean it as soon as possible but no later than thirty (30) days. If there are access issues or obstructions, the catch basin shall be cleaned within thirty (30) days of gaining proper access. All inspection, cleaning, and maintenance activities shall be documented using the Permittee's newly developed GIS-mobile field application and included in the Annual Report.
- 3.3.4.2 As part of its catch basin maintenance program, the Permittee shall continue to implement its GIS-based mobile field application for asset management and tracking maintenance activities.
- 3.3.4.3 Based on data collected using the mobile field application, the Permittee shall continue to implement changes to catch basin cleaning frequencies as necessary for specific portions of the MS4 Permit Area and update the SWMP Plan accordingly.

3.3.5 Storm Drain Outfall Operation and Maintenance

The Permittee shall continue to implement the District's outfall repair plan to ensure that outfalls in poor condition do not impair water quality. During this permit term, the Permittee shall repair twenty (20) outfalls in need of repair.

3.3.6 Maintenance of Conveyance System Piping Infrastructure

Not later than four years from the effective date of this permit, the Permittee shall develop a program to inspect and clean the conveyance system piping infrastructure on a rotating basis of sufficient frequency, which shall be outlined in the program, to mitigate

sedimentation and prevent obstruction of the conveyance system piping infrastructure. The program shall give priority to areas with known or suspected sedimentation and areas where the conveyance system discharges to waterbodies impaired by toxics such as PCBs, which are known to be found in legacy sediments. The Permittee shall implement the program once the development is completed. The Permittee shall continue to perform its existing inspection and cleaning program until the new program is implemented.

3.3.7 Street Sweeping

The Permittee shall conduct street sweeping on a minimum of 10,932 road miles annually within the MS4 Permit Area. The Permittee shall continue the practice of using a georeferencing-based street sweeping system to report a more accurate estimate of street miles swept annually.

3.3.8 Transportation and Utility Construction Activities

The Permittee shall ensure that standard and emergency utility and road repair projects limit the amount of soil disturbance to only what is necessary to affect the repair. The projects shall implement basic soil erosion and sedimentation control measures and remove silt from dewatering prior to discharge. In addition, stormwater conveyances that are denuded shall be re-sodded, reseeded and mulched, or otherwise stabilized for rapid revegetation, and these areas must have effective erosion control until stabilized.

3.3.9 Snow and Ice Management

- 3.3.9.1 The Permittee shall continue to manage the application of anti-icers, chemical deicers, salt, sand, and/or sand/deicer mixtures to minimize the impact of these materials on water quality.
- 3.3.9.2 Per the requirement to continue the pilot program to investigate alternatives to improve water quality as described in Section 2.6 of this permit, should pilot results show that an alternative is operationally and financially feasible, the Permittee shall begin implementing new ice and snow management procedures and practices as outlined in the District Snow and Ice Removal Plan no later than one year after the completion of the road salt alternatives pilot.
- 3.3.9.3 The Permittee shall continue to implement and update a program to ensure that excessive quantities of snow and ice control materials do not enter the District's water bodies. Except when the Permittee determines that the foremost concern of snow removal activities is public health and safety, the Permittee shall avoid snow dumping or storage in areas adjacent to water bodies, wetlands, or areas near public or private drinking water wells which would ultimately discharge to, from, or through the MS4.

3.4 Critical Sources

- 3.4.1 Inventory of Critical Sources and Source Controls
- 3.4.1.1 The Permittee shall continue to maintain an up-to-date inventory or database of all facilities, including federal facilities, that are Critical Sources of stormwater pollution as defined at Part 8 of this permit.
- 3.4.1.2 The Permittee shall include in the Critical Source inventory the following minimum fields of information for each Critical Source:
 - a. Name of facility and name of owner/ operator;
 - b. Address of facility or operation;
 - c. Size of facility or operation;
 - d. Activities conducted at the facility or operation that could impact stormwater;
 - e. Stormwater management controls, including spill prevention and response measures; and
 - f. Inspection and maintenance schedules, dates, and findings.

3.4.2 Inspection of Critical Sources

Unless otherwise covered under the *Multi-Sector General Permit (MSGP)* for Stormwater Discharges Associated with Industrial Activity or an individual permit, the Permittee shall continue to inspect all Critical Sources in the MS4 Permit Area that are identified in the Critical Source Inventory at least two times during the five-year term of this permit. Critical Sources covered under the MSGP, or an individual permit, shall be inspected according to the EPA-approved *Compliance Monitoring Strategy* or the inspection schedule required by the individual permit.

3.4.3 Compliance Assurance

At each Critical Source, the Permittee shall verify that the operator is implementing a control strategy sufficient to protect water quality, including all maintenance and spill prevention and response measures. Where the Permittee determines that existing measures are not adequate to protect water quality, the Permittee shall require and enforce additional site-specific controls sufficient to protect water quality.

3.5 <u>Construction Activities</u>

3.5.1 Erosion and Sediment Control Regulations

The Permittee shall continue to implement the District's Erosion and Sediment Control Regulations for all projects that are fifty (50) square feet or larger, consistent with current policies and regulations, to reduce the discharge of pollutants from construction activities.

3.5.2 Plan Review and Approval

The Permittee shall continue to implement the review and approval process for erosion and sediment control plans consistent with the District Stormwater Regulations. Also, the Permittee shall ensure that all construction activities impacting one acre or greater, or less than one acre when part of a larger common plan of development or sale that is one acre or greater, are not authorized until the Permittee receives documentation that the construction activity has received coverage under EPA's NPDES General Permit for Discharges from Construction Activities (CGP).

3.5.3 Inspections

The Permittee shall continue to implement inspection procedures, including but not limited to, inspections of permitted construction sites that disturb more than 5,000 square feet of soil, as follows:

- Pre-construction meeting prior to commencement of stormwater control measure construction, to review soil and sediment control measures, site conditions, and ensure they are accurately described in approved erosion and sediment control plans, appropriate permits, and stormwater pollution prevention plans;
- b. Initial compliance monitoring inspection to verify proper installation of sediment and erosion control measures as determined at pre-construction meeting;
- Routine compliance monitoring inspections throughout the duration of land disturbing activity, performed on a schedule based upon project and activity phases that ensures compliance with applicable erosion and sediment requirements;
- d. Follow-up inspections for sites that are found to be out of compliance during any routine compliance monitoring inspection or enforcement actions; and
- e. Final inspection to verify full stabilization of the project site as per erosion and sediment control plan and completion of stormwater management controls as per Department-approved certified as-built plans.

The Permittee shall continue to implement inspection procedures, including but not limited to, inspections of permitted construction sites that disturb more than one acre of soil, as follows:

- a. Pre-construction meeting prior to commencement of stormwater control measure construction, to review soil and sediment control measures, site conditions, and ensure they are accurately described in approved erosion and sediment control plans, appropriate permits, and stormwater pollution prevention plans;
- b. Initial compliance monitoring inspection to verify proper installation of sediment and erosion control measures as determined at pre-construction meeting;

- c. Routine compliance monitoring inspections throughout the duration of land disturbing activity, performed either: (1) once every 7 calendar days or (2) once every 14 calendar days and within 24 hours of the occurrence of a storm event that produces 0.25 inches or more of rain within a 24-hour period, to ensure compliance with relevant standards and requirements;
- d. Follow-up inspections for sites that are found to be out of compliance during any routine compliance monitoring inspection or enforcement actions; and
- e. Final inspection to verify full stabilization of the project site as per erosion and sediment control plan and completion of stormwater management controls as per Department-approved certified as-built plans.

The Permittee shall ensure that construction activity inspectors prioritize inspections in targeted areas, such as sites discharging to water quality-impaired waters, sites near surface waters, areas undergoing rapid development, large construction sites, and sites with a history of non-compliance.

The Permittee shall ensure that individuals trained as required by Section 3.9 and Table 3, perform construction site inspections and that inspectors receive adequate training prior to performing field activities. It is recommended that inspectors maintain a construction inspection certification or license from a program such as EPA's Construction Inspection Training Course⁶.

3.5.4 Enforcement

When a violation of local erosion and sediment control regulations occurs, the Permittee shall follow existing enforcement procedures and practices using standardized reports as part of the inspection process to provide accurate record-keeping of inspections of construction sites.

3.6 <u>Illicit Discharges and Illegal Disposal</u>

3.6.1 Illicit Discharges

The Permittee shall continue to implement and refine the procedures and practices implemented to prevent (to the extent practicable), detect, and eliminate illicit discharges to, from, and through the MS4.

3.6.1.1 The Permittee shall continue to refine and update the inventory of all outfalls in the MS4 Permit Area, including any changes to the identification and mapping of existing permitted outfalls. This inventory shall be integrated with GIS and shall include size, type, location (GPS coordinates), condition, receiving water, date of the last inspection, and information pertaining to the facility or facilities that discharge to each outfall (including name, address, and description of the facility using SIC or similar code). The Permittee shall use this

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⁶ https://www.epa.gov/npdes/construction-inspection-training-course

information to develop updated maps of outfalls and sewersheds for use in the field conducting outfall inspections and for subsequent desktop analysis of any discharges.

- 3.6.1.2 The Permittee shall continue to conduct regular dry weather screening inspections in target areas, per the procedures in Section 4.4 of this permit.
- 3.6.1.3 The Permittee shall continue to maintain a system for reporting illicit discharges and providing immediate responses to those reports.
- 3.6.1.4 The Permittee shall continue to issue fines and undertake additional enforcement procedures, as necessary, to eliminate illicit discharges.
- 3.6.1.5 The Permittee shall continue to implement procedures to prevent, contain, and respond to spills that may discharge to, from, or through the MS4.
- 3.6.1.6 The Permittee shall maintain a database of all identified illicit discharges and information on their elimination.

3.6.2 Illegal Disposal

The Permittee shall continue to implement the prohibition against the disposal or dumping of used motor vehicle fluids, household hazardous wastes, grass clippings, leaf litter, and animal waste to, from, or through the MS4. The Permittee, including the Metropolitan Police Department and Department of Public Works, shall continue to enforce against illegal dumping.

The Permittee shall ensure the implementation of programs to collect used motor vehicle fluids (at a minimum oil and anti-freeze) for recycle, reuse, and proper disposal and to collect household hazardous waste materials (including paint, solvents, pesticides, herbicides, and other hazardous materials) for recycle, reuse, or proper disposal. The Permittee shall ensure that such programs are readily available within the District, and that they are publicized and promoted on a regular basis, pursuant to Public Education provisions at Section 3.10 of this permit.

3.7 Targeted Pollutant Controls

The Permittee shall continue to ensure implementation of local source control programs to support attainment of identified water quality objectives including TMDL wasteload allocations for trash, polyaromatic hydrocarbons, nitrogen, phosphorus, multiple metals, and toxics.

3.7.1 Trash Prevention and Removal

- 3.7.1.1 The Permittee shall continue to attain the capture, prevention, or removal of 108,347 pounds of trash annually from the Anacostia River, as determined in the Anacostia River Watershed Trash TMDL, as a specific single-year measure, using a combination of trash traps and other structural controls, clean-ups, hotspot sweeping, skimmer boat activities, and prevention measures (e.g., education and outreach, policies focused on specific types of trash).
- 3.7.1.2 The Permittee shall apply the technologies and other activities developed in the Anacostia River Watershed Trash TMDL efforts throughout the entire MS4 Permit Area, where feasible.

3.7.2 Disposable Bag Fee

The Permittee shall continue to implement the Anacostia Clean Up and Protection Act of 2009 and shall continue to conduct public outreach and enforcement activities regarding the Act.

3.7.3 Polystyrene Foam Food Containers Ban

The Permittee shall continue to implement the District's ban on certain polystyrene foam food containers (including service ware items) and shall continue to conduct public outreach and enforcement activities regarding the ban.

3.7.4 Plastic Straw Ban

The Permittee shall continue to implement the District's ban on single-use plastic straws and stirrers and shall continue to conduct public outreach and enforcement activities regarding the ban.

3.7.5 Coal Tar Ban

The Permittee shall continue to implement the District's ban on coal tar pavement products and shall continue to conduct public outreach and enforcement activities regarding the ban.

3.7.6 Restriction on Phosphorus in Lawn Fertilizers

The Permittee shall continue to implement the District's program on phosphorus lawn fertilizer restrictions and shall continue to conduct public outreach and enforcement activities regarding the program.

3.7.7 Hazardous Waste Collection

The Permittee shall continue to implement a hazardous waste collection program and shall continue to conduct public outreach activities regarding the program.

3.7.8 Leaf and Yard Waste Collection

The Permittee shall continue to implement a leaf and yard waste collection program and shall continue to conduct public outreach activities regarding the program.

3.8 Operation and Maintenance of Stormwater Control Measures

3.8.1 District-Operated Stormwater Control Measures

The Permittee shall continue to improve and implement operation and maintenance (O&M) protocols, policies, and guidance for all District-owned and operated stormwater control measures, including maintenance needs and triggers, inspection frequencies, and a tracking system to document relevant information.

The permittee shall perform all maintenance activities for green stormwater infrastructure (GSI) on properties owned or managed by the District of Columbia. All GSI shall be properly maintained in consultation with the most recent iteration of DOEE's Stormwater Management Guidebook.

3.8.2 Non-District-Operated Stormwater Control Measures

The Permittee shall continue to improve and implement O&M protocols, policies, guidance, ordinances, codes, inspections, and other accountability measures for all stormwater control practices on non-District-controlled property. Such accountability measures may include combinations of deed restrictions, ordinances, maintenance agreements, or other policies deemed appropriate by the Permittee. The Permittee shall also include a long-term verification process of O&M, which may include municipal inspections, third-party inspections, owner/operator certifications on a frequency deemed appropriate by the Permittee, and/or other mechanisms. The Permittee must continue to maintain an electronic inventory of practices on private property and O&M information for each such stormwater control measure.

3.9 Stormwater Training

For all activities included in Section 3.3 of this permit, the Permittee shall continue to train those employees, contractors, subcontractors, and agents specified below, and any other individuals whose job functions may impact stormwater program implementation on an annual basis or within six months of being hired.

The training shall include any changes in procedures, techniques, or requirements and address the following items as relevant to specific job responsibilities: (i) the importance of protecting water quality; (ii) the requirements of this permit; (iii) design, performance, operation and maintenance standards; (iv) inspection procedures; (v) the selection of appropriate stormwater control measures; (vi) ways that job activities are to be performed in order to prevent or minimize impacts to receiving waters; and (vii) procedures for tracking, inspecting, and reporting – including potential illicit discharges.

In addition, the Permittee shall continue training developers and other relevant stakeholders on the requirements of District stormwater regulations and the best practices outlined in the 2020 *Stormwater Management Guidebook*. As appropriate, the Permittee may combine this training with training on other relevant topics, such as climate change.

The Permittee shall develop and offer training to all employees responsible for the implementation of this permit related to incorporating diversity, equity, inclusion, and justice (DEIJ) into Clean Water Act objectives associated with the MS4 Permit Area. Within three years after the effective date of this permit, the Permittee shall conduct an inventory of all existing CWA-related training programs and identify which of those would be appropriate for including DEIJ content. Within one year of completing this inventory, the Permittee shall develop the appropriate DEIJ content for, and incorporate that content in, those identified training programs. Training shall begin to be offered upon completion of its development.

In accordance with Table 3 below, the Permittee shall ensure that the training program includes those employees, contractors, subcontractors, and agents who work in the following areas, and others as deemed necessary:

TABLE 3
Training for Stormwater Management and Pollution Prevention

Duties of Person to be Trained	Training Areas
	Impacts of stormwater pollution and sources
Relevant employees at all District industrial	of runoff and pollutants
facilities	The requirements of this permit
	Overview of what is in facility SWPPP
	Spill response, good housekeeping, and
	material control measures
	O&M of stormwater controls
	Inspection and reporting procedures
Municipal Planning	Plan Review
Transportation planning and engineering	Planning design, installation, and/or
	operation and maintenance of stormwater
	control measures
Road and utility crews	Street sweeping
	Catch basin cleanout

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3.10 <u>Targeted Public Education</u>

The Permittee shall continue to refine and deliver targeted education efforts and to measure the understanding and adoption of selected targeted behaviors among the targeted audiences, in accordance with the metrics contained in Table 4 below. The Permittee shall report on all metrics in each annual report during this permit term. If new, more informative

metrics are developed they may supplement or replace the existing metrics. The Permittee shall use the metrics to direct education and outreach resources most effectively, as well as to evaluate changes in adoption of the targeted behaviors.

Table 4
Public Education Initiatives and Metrics

Education Targets and Objectives	Metrics
General Public	
General sources of stormwater pollution and impacts of	Number of views of DOEE's
stormwater flows into surface waters	stormwater website content
Source control practices and environmental stewardship	Adoption of stormwater
actions in landscaping and rainwater reuse	practices by target audiences
	through the RiverSmart
	Program
A household hazardous waste education and outreach	Level of participation in HHW
program to control illicit discharges to the MS4	collection program
	Utilization of illicit discharge
	reporting system
Vehicle maintenance stormwater control measures,	 Implementation of used
including car washing practices	motor vehicle fluids
	collection and/or recycling
	program
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Meaningful watershed educational experiences and	Number of District youth
other education for District youth and teachers	receiving environmental
	education
	Number District teachers
	receiving environmental
	education training
Business and Industry	
Impacts of increased stormwater flows and pollution into	Number of views of DOEE's
receiving water bodies and sources of runoff and	stormwater website content
pollutants	
Stormwater control measures for use and storage of	Track compliance and
automotive chemicals, pesticides, hazardous cleaning	noncompliance at industrial
supplies, and other materials	and critical source operations
Impacts of illicit discharges and how to prevent and	Utilization of illicit discharge
report them	reporting system
Stormwater permitting requirements and pollution	Number/percentage of
prevention plans that require development of	industrial facilities with
stormwater control measures	SWPPPs
Homeowners and Residents	

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Impacts of increased stormwater flows and pollution into	Number of views of DOEE's
receiving water bodies	stormwater website content
Runoff reduction techniques, including landscape design,	Adoption of stormwater
site design, on-site retention, pervious paving, retention	practices by target audiences
of forests and mature trees	through the RiverSmart
Monitoring and maintenance of on-site stormwater	Program
control measures	Number of RiverSmart audits
Yard care and landscaping techniques that protect water	
quality, including fertilizer application	completed
Focused community engagement for historically	Number of outreach events
underserved communities	
dilderserved communities	conducted
	Number of multi-lingual
	educational materials
	distributed
	Activities performed related
	·
	to community level actions
	in underserved areas
Swimming pool discharge and maintenance	Number of illicit discharges
Swiffining poor discharge and maintenance	
	reported into the MS4 from
	swimming pools
Education materials, signage and pet waste bags and	Number of pet waste bag
repositories at dog parks and other high pet traffic areas	dispensers/disposal
	containers
	Number of pet waste
	disposal bags used
	 Number of tweets/posts by
	the Mayor's Office regarding
	proper pet waste disposal
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Engineers, Contractors, Developers, Construction Operator	s, Review Staff and Land Use
Planners	I
Impacts of increased stormwater flows into receiving	Number of views of DOEE's
water bodies	stormwater website content
Technical standards for stormwater regulations including,	Attendance at stormwater
but not limited to, the following:	workshops and trainings
i. Construction site sediment and erosion control	• Numbers/trends in site plan
ii. Stormwater Retention Volume	submittals consistent with
iii. Water Quality Treatment Volume	requirements

iv.	Extreme flood requirements	
v.	Green Area Ratio requirements	
vi.	Public Right-of-Way requirements	
Runof	f reduction techniques, including site design, on-	
site re	eduction, pervious pavement, alternative parking lot	
design	n, retention of forests and mature trees	
Storm	water treatment and flow controls	
How t	o utilize the online Stormwater Database	Track successful use of the Database

Part 4. WATER QUALITY ASSESSMENT

4.1 <u>Water Quality Assessment Program</u>

4.1.1 Assessment Program Objectives

The Permittee shall continue its long-term assessment program to meet the following objectives:

- 4.1.1.1 Make wet weather loading estimates of annual pollutants from the DC MS4 Permit Area to receiving waters.
- 4.1.1.2 Evaluate the health of receiving waters within the context of assessing the impacts of MS4 discharges.
- 4.1.1.3 Perform additional monitoring as necessary to identify additional sources of pollutants and track progress towards meeting WLAs.

4.1.2 Assessment Program Overview

Table 5 provides an overview of the types and frequencies of monitoring that the Permittee shall conduct.

TABLE 5
Overview of the Water Quality Assessment Program

Monitoring Element	Frequency
Wet Weather Monitoring	3 events each year
Dry Weather Screening	On a rolling basis so that each outfall is inspected once in the permit term

Macro-invertebrates	Every other year
Habitat	Part of the RSA for each stream reach at least once during the permit term
Geomorphology	Part of the RSA for each stream reach at least once during the permit term
Receiving Water Quality	Once each month
Trash Traps	4 times each year
Trash Transect	Twice each year

4.1.3 Requirements Common to all Assessment Program Elements

- 4.1.3.1 The Permittee shall ensure that all analyses are performed in accordance with analytical methods approved under 40 C.F.R. Part 136 and subsequent amendments. When there is not an approved analytical method the Permittee may use any method supported by relevant scientific literature and must provide a description of the method in the Quality Assurance Program Plan (QAPP).
- 4.1.3.2 The Permittee is authorized to use a more current or sensitive detection method than the one identified in 40 C.F.R. Part 136 if one exists for a particular parameter, for example, PCBs (Method 1668B) and mercury (Method 1631E). If used, the Permittee shall report the alternative method for compliance reporting and monitoring purposes in the QAPP.
- 4.1.3.3 The Permittee shall continue to select and use appropriate flow measurement devices and methods consistent with accepted scientific practices to ensure the accuracy and reliability of measurements of the volume of monitored discharges. The devices shall be installed, calibrated, and maintained to ensure that the accuracy of the measurements is consistent with the accepted capability of that type of device.
- 4.1.3.4 The Permittee shall continue to retain records of all monitoring information, including all calibration and maintenance records, for a period of at least five (5) years from the date of such sample, measurement, or report. Records of monitoring information shall include the items contained in Table 6 below:

TABLE 6
Monitoring and Assessment Records Retention

Date, exact location, time, and methods of sampling	
measurements	
Individual(s) who performed the sampling measurements	
Date(s) analyses were performed	
Individual(s) who performed the analyses	
Analytical techniques or methods used	
Results of such analyses	

4.2 Wet Weather Discharge Monitoring

4.2.1 Pollutants, Collection Methods, and Frequencies

The Permittee shall conduct wet weather discharge monitoring for all the pollutants in Table 7 for a minimum of three wet weather events, as defined in Subsection 4.2.4 of this permit, each year. The Permittee shall report the results of each event in the DMR.

TABLE 7
Wet Weather Discharge Sample Parameters and Collection Methods

Pollutant	Collection Method	
Total suspended solids	Composite Sample	
Total nitrogen	Composite Sample	
Total phosphorus	Composite Sample	
Copper	Composite Sample	
Lead	Composite Sample	
Zinc	Composite Sample	
Cadmium	Composite Sample	
E. coli	Grab Sample	

4.2.2 Associated in situ Sampling

When conducting the wet weather discharge monitoring required by Subsection 4.2.1 above, the Permittee shall also collect *in situ* samples for water temperature, dissolved oxygen, conductivity, pH, and hardness to provide the necessary information for appropriate interpretation of wet weather data.

4.2.3 Sampling Locations

The Permittee shall conduct wet weather discharge monitoring at all continuous record sites and all stratified random sites as specified in Table 8 below. Stratified random "oversample" sites, identified in the QAPP required by Subsection 4.4.1.1 of this permit, may permanently replace a stratified random site from the same watershed should conditions warrant. The Permittee may substitute stratified random sites for oversample sites not included in Table 8 but must explain and justify those substitutions. Continuous record sites may also be adjusted with sufficient justification.

TABLE 8
Sampling Locations for Wet Weather Discharge Monitoring

Sampling Location	Watershed	Type of Site
Outfall 999 – Gallatin Street & 14 th Street NE	Anacostia River	Continuous Record
Outfall 124 - Oxon Run – Mississippi Ave and	Potomac River	Continuous Record
15 th St. SE		
Outfall 851- Soapstone Creek – Connecticut	Rock Creek	Continuous Record
Avenue and Albemarle Street NW		
Outfall 1035 – Kenilworth and Douglas	Anacostia River	Stratified Random
Outfall 260 – 53 rd and Dix Street	Anacostia River	Stratified Random
Outfall 950 – Tributary to Potomac	Potomac River	Stratified Random
Outfall 103 – Oxon Run	Potomac River	Stratified Random
Outfall 825 – Tilden and Reno	Rock Creek	Stratified Random
Outfall 901 – Tributary to Pinehurst Branch	Rock Creek	Stratified Random

4.2.4 Qualifying Wet Weather Events

- 4.2.4.1 The Permittee shall collect all samples from a discharge resulting from a storm event that is greater than 0.1 inches in predicted precipitation and that occurs at least 72 hours from the end of a previous event with at least 0.1 inches of measured rainfall within the MS4 Permit Area.
- 4.2.4.2 The Permittee shall maintain the following records regarding wet weather sampling: (i) date and duration (in hours) of the storm events sampled; (ii) rainfall measurements or estimates (in inches) of the storm event which generated the sampled runoff; (iii) the duration (in hours) between the storm event sampled and the end of the previous measurable (greater than 0.1 inch rainfall) storm event; (iv) a calculated flow estimate of the total volume (in gallons); and (v) nature of the discharge sampled.

4.3 Rapid Stream Assessment Program

The Permittee shall maintain the Rapid Stream Assessment (RSA) Program that was established in 2019. The Permittee shall complete the evaluation of all accessible stream reaches by the end of the five-year permit term.

The Permittee shall develop a QAPP to support the RSA program separately from the document required in section 4.4.1.1 for other receiving water assessment monitoring. The Permittee may review the QAPP that was developed in 2019 and attached to the 2020 MS4 Annual Report and revise if necessary to comply with the terms of the permit. The Permittee shall submit a final QAPP to EPA by the end of the first year of the permit cycle.

4.3.1 Geomorphology Assessment

The Permittee shall conduct an evaluation of geomorphological features in association with the RSA for each stream reach in the MS4 Permit Area during the term of this permit. Evidence shall be recorded of any changes in the in-stream geomorphology (i.e., floodplain connectivity, approximate Rosgen classification) as well. All assessments shall be performed using a Rosgen Level 1 or other appropriate classification system and according to the QAPP required by Section 4.3 of this permit.

4.3.2 Habitat Assessment

The Permittee shall assess certain habitat metrics in association with the RSA for each stream reach in the MS4 Permit Area during the term of this permit. A broad range of physical habitat metrics (i.e., fish presence, aquatic vegetation, algae, bacteria presence, etc.) shall be evaluated on perennial reaches while an abbreviated assessment shall be conducted for temporary reaches. Evidence shall be recorded of any changes in the in-stream physical habitat (i.e., substrate type, erosion, riparian area) as well. All assessments shall be performed according to the QAPP required by Section 4.3 of this permit.

4.4 <u>Receiving Water Assessments</u>

4.4.1 Maintaining the Receiving Waters Assessment Program

- 4.4.1.1 The Permittee shall develop a QAPP to support all elements of the receiving waters assessment program in Sections 4.2, 4.4.2 and 4.4.3. The Permittee shall complete a comprehensive draft QAPP prior to beginning field sampling and assessments required by this permit but may adjust the QAPP throughout the first year of the sampling cycle. The Permittee shall submit a final QAPP to EPA at the end of the first year of the sampling cycle.
- 4.4.1.2 The Permittee shall ensure that all receiving water assessment activities required by this permit adhere to those documented in the QAPP.
- 4.4.1.3 The Permittee shall ensure that upstream and downstream photographs are taken at each site at the time each sample is collected, or assessment is conducted.
- 4.4.1.4 The Permittee shall ensure that current and recent weather (*i.e.*, within the past 24 hours) is recorded for each sampling and assessment activity.

- 4.4.1.5 The Permittee shall ensure that all monitoring activities are conducted within the same 75-meter stream reach per site, unless site conditions preclude such monitoring as documented by the Permittee.
- 4.4.1.6 The Permittee shall ensure that all sampling and data collection protocols have associated field data sheets, quality assurance/quality control (QA/QC) procedures, and chain of custody forms (as appropriate). Data collection may be recorded digitally with electronic back-up procedures.
- 4.4.1.7 The Permittee shall continue to populate and maintain its central geodatabase to store locational information and data sets. Metadata for all data sets shall continue to be recorded.

4.4.2 Receiving Water Quality Sampling

The Permittee shall sample receiving waters for the indicator parameters in Table 10 at the frequency identified in the QAPP. Frequency generally is targeted to at least one time every month per the overview provided in Table 5. However, sampling frequencies for specific parameters shall be refined and must be specifically documented and explained in the QAPP. Thereafter, sampling frequencies shall be consistent for the remainder of the permit term. Sampling and analysis procedures shall be performed according to the QAPP required by Subsection 4.4.1.1 of this permit.

TABLE 9
Receiving Water Quality Sampling Parameters

Total nitrogen	Total phosphorus
Total Suspended Solids	Water Temperature
Conductivity	E. Coli
Dissolved Oxygen	

4.4.3 Benthic Macroinvertebrate Sampling

The Permittee shall sample for benthic macroinvertebrates during the spring index period (March 1 through April 30) each year using the protocol documented in the QAPP required by Subsection 4.4.1.1 of this permit. Sampling must be implemented on a rolling basis such that each site will be sampled bi-annually.

4.5 Dry Weather Screening and Source Identification

4.5.1 Identifying Dry Weather Flows and Sources

- 4.5.1.1 The Permittee shall ensure that field crews visually assess each MS4 outfall using DOEE's Dry Weather Outfall Inspection Form, documenting outfall identification, location, and physical characteristics such as the presence of odor, oily sheen, turbid discharge and floatables, and any other dry weather flows. Photos, forms, and notes on changes since the previous inspection shall be linked to the outfall database.
- 4.5.1.2 Frequency of visual monitoring shall be based on a priority system that balances knowledge of prior problems, land use, priority areas in the MS4 Permit Area, and other factors. All outfalls shall be visually inspected at least one time during the permit term.
- 4.5.1.3 All dry weather flows identified during inspections that are not immediately identifiable shall be followed up-line to determine the source.
- 4.5.1.4 If visual monitoring indicates that there is no measurable dry weather flow, but there is evidence of intermittent discharge (e.g., staining, small trickle, algal growth), the Permittee shall revisit the outfall within three (3) days of the previous visual monitoring to check for measurable flow.
- 4.5.1.5 If the source cannot be identified from visual observations, the Permittee shall take *in situ* screening samples to help identify the source(s) of the flow.
- 4.5.1.6 If the source cannot be identified through visual or in-field chemical screening methods, the Permittee shall conduct a desktop analysis, involving cross-referencing with other dry weather flows, the database of critical sources and other applicable information. Follow-up investigations may include dye testing, video inspection, evaluation of facilities in the sewershed, and additional sampling.

4.5.2 Bacteria Source Reduction Activities

Based upon the results of sampling studies using microbial source tracking in the Rock Creek and Anacostia watersheds, the Permittee shall conduct the targeted bacteria source reduction efforts listed below to assist in achieving *E. coli* reductions, including achievement of applicable WLAs, in waters impaired by *E. coli*.

Anacostia Watershed:

By the end of the permit term, the Permittee shall complete an illicit discharge investigation in the Fort Dupont and Fort Chaplin catchments to determine the source of dry weather flow that contains markers for human waste.

Beginning in 2025, the Permittee shall conduct targeted pet waste disposal education/outreach to the public in the Fort Chaplin catchment area. This outreach may also be counted as part of the environmental justice efforts required in Section 7.3.2.

Rock Creek Watershed:

By the end of year two of the effective date of the permit, the Permittee shall complete an illicit discharge investigation for the land draining to the Broad Branch monitoring station that was identified in the Permittee's MST study for the Rock Creek watershed.

All activities performed shall be described in each applicable annual report.

4.6 <u>Trash Monitoring</u>

4.6.1 Trash Trap Monitoring

The Permittee is required to perform the following activities to ensure compliance with the water quality objectives of the Anacostia Trash TMDL.

- 4.6.1.1 The Permittee shall continue to collect the weight and counts of different types of trash for all trash traps at least four (4) times per year. The Permittee shall capture data on weight and count for the following trash types: food wrappers, beverage containers, plastic bags, foam products (including food and non-food related products made of polystyrene), tires, and plastic balls.
- 4.6.1.2 All trash traps shall be stationary control measures installed as necessary in the MS4 Permit Area. Each installed trap shall be maintained on a weekly basis and after a major storm event, to prevent traps from reaching or exceeding capacity.
- 4.6.1.3 Data shall be reported in the Annual Report on the amount of trash captured by all trash traps in the MS4 Permit Area.

4.6.2 Transect Monitoring

- 4.6.2.1 The Permittee shall sample 500-foot transects at thirteen (13) locations in the Rock Creek, Potomac River, and Anacostia River watersheds at least two times per year. Data on trash counts shall be collected at all thirteen (13) sites.
- 4.6.2.2 These data shall be used to assess effectiveness of District trash reduction initiatives, including the bag fee and the foam ban, as well as to inform future policy decisions related to trash.

4.7 Data Synthesis

4.7.1 Programmatic Indicators

The Permittee shall evaluate the effectiveness of the SWMP using multiple programmatic indicators linked to the requirements in Part 3 of this permit. The Annual Reporting Template in Appendix A of this permit identifies the programmatic indicators used to evaluate the success of implementing stormwater control measures.

4.7.2 Watershed Indicators

The Permittee shall also evaluate the effectiveness of the SWMP using multiple watershed indicators linked mostly to the assessment requirements of Part 4 of this permit, and the synthesis of those data through analysis and modeling.

- 4.7.2.1 The Permittee shall estimate annual cumulative pollutant loadings for all pollutants listed in Table 7 of this permit.
- 4.7.2.2 The Permittee shall estimate annual progress towards all numeric limits in Subsection 1.5.3.1 of this permit for acres managed and pounds of trash in the Anacostia River Watershed.
- 4.7.2.3 Using all other data and information collected per the water quality assessment requirements of Part 4 of this permit, the Permittee shall continue to implement the suite of indicators identified in the 2022 SWMP that address discharge quality as well as receiving water quality. These indicators shall balance current status with long-term trends in order to determine elements of the program that are effective and those needing additional improvement. Any changes/additions to the suite of indicators shall be included with the updated SWMP submitted to EPA as part of the application package for permit renewal per Section 2.10 of this permit.

4.7.3 Assessing Strengths and Weakness of the Program

- 4.7.3.1 In each annual report the Permittee shall provide a short synthesis of areas of the program deemed effective with ongoing effort, and areas where additional strategies are needed to effectively address certain pollutants or sources, supported by interpretation of both programmatic and watershed indicators. Conclusions shall be based on interpretations of the indicators.
- 4.7.3.2 With the annual report in the fourth year of the permit (2027) the Permittee shall provide a synopsis of progress made towards meeting all WLAs applicable to the DC MS4, and a summary of program elements that shall be enhanced in the updated SWMP to make timely progress towards Clean Water Act objectives and meeting the District's water quality standards.

4.8 Data Management

4.8.1 Database Organization

The Permittee shall continue to maintain their water quality database and any other data collection systems to ensure long-term integrity of information and effective and nimble data storage, management, and retrieval.

4.8.2 Data Stewardship

The Permittee shall ensure that all relevant databases are stewarded by data managers who shall ensure consistency and accountability in data quality assurance, entry, and maintenance.

Part 5. <u>REPORTING REQUIREMENTS</u>

5.1 Discharge Monitoring Reports

Discharge Monitoring Reports (DMRs) must include all analytical results of all discharge monitoring described in Part 4 of this permit.

The Permittee shall submit DMRs on an annual basis via NetDMR (http://www.epa.gov/netdmr/). DMRs are due each year no later than December 1 and shall include all data for the yearly sampling cycle July 1 through June 30.

5.2 Annual Reporting to EPA

5.2.1 Annual Report Schedule

The annual reporting cycle shall cover the period of July 1 through June 30 of each year. The Permittee shall submit an Annual Report to EPA no later than December 1 of each year starting with December 1, 2024.

5.2.2 Annual Report Template

The Annual Report shall follow the format and include the content of the Annual Report Template in Appendix A of this permit. The Permittee is encouraged to use the fillable PDF version of this template provided by EPA for each Annual Report until such a time that an electronic version of the annual report is made available in EPA's NPDES Electronic Reporting Tool (NeT). Once that conversion is completed, all annual reports are required to be submitted electronically via the NeT system. The Permittee shall post the Annual Report on the DOEE website on or about the same time as it is submitted to EPA.

5.3 Reporting to the Public

5.3.1 MS4 Annual Report Story Map

The Permittee shall continue to maintain its MS4 Annual Report Story Map, specifically designed to provide data and information to the public, including District residents and other stakeholders, in a format most useful and accessible to these audiences. The Permittee shall make this graphical interface available annually within two months following submittal of each Annual Report.

The graphical interface shall include the following types of information linked through a GIS-referenced set of maps: locations of all stormwater control measures in the MS4 Permit Area, sortable by type/function, drainage area, storage volume and installation date; data on stormwater retention credits certified in the MS4 Permit Area; statistics on implementation of specific types of management practices such as green roofs and trees; TMDL WLAs by stream segment and by pollutant; and monitoring locations linked to monitoring data.

The graphical interface shall be refined over time to supplement this information with other data and syntheses, visual aids such as photos, graphs, and charts, multimedia content such as videos, and external links to other relevant information.

5.3.2 Website Information Repository

The Permittee shall make available to the public on the DOEE website the most recent or updated version of all documents, reports, and assessments in a format that is easily accessible and logically navigable. Consistent with Part 2 of this permit, this shall include all documents and reports considered part of the SWMP and *Consolidated TMDL Implementation Plan*. Consistent with Section 2.8 of this permit, this shall include all plans and assessments in Table 2. Consistent with Subsection 5.2.2 of this permit, this shall include the Annual Reports. The Permittee may choose to incorporate any portion of the information in these documents and assessments into the MS4 Annual Report Story Map required in Subsection 5.3.1, post them as separate documents, or a combination of both.

5.3.3 Permit Limit and Benchmark Progress

The Permittee shall publicly report on annual progress toward all numeric limits in this permit and all benchmarks in the *Consolidated TMDL Implementation Plan* in a readily-understandable format. This reporting may be included as part of the graphical interface, or combinations of graphical interface, Annual Reports and other assessments, as long as the public is able to understand and track progress.

Part 6. STANDARD PERMIT CONDITIONS FOR NPDES PERMITS

This permit is issued subject to all applicable federal regulations. Failure to set forth the full language of any applicable regulation or requirement below; however, does not change or waive its applicability in any way.

6.1 Duty to Comply

- 6.1.1 The Permittee must comply with all conditions of this permit. Any permit noncompliance constitutes a violation of the Clean Water Act (CWA) and is grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or denial of a permit renewal application.
- 6.1.2 Any person may be assessed an administrative penalty by the Administrator for violating Section 301, 302, 306, 307, 308, 318 or 405 of the CWA, or any permit condition or limitation implementing any of such sections in a permit issued under section 402 of the CWA.
- 6.1.3 The CWA provides that any person who violates Section 301, 302, 306, 307, 308, 318, or 405 of the CWA, or any permit condition or limitation implementing any such sections in a permit issued under Section 402, or any requirement imposed in a pretreatment program approved under Sections 402 (a)(3) or 402 (b)(8) of the CWA, is subject to a civil penalty. Any person who negligently or knowingly violates such sections of the CWA or such permit requirements is subject to criminal penalties or by imprisonment, or both. (40 CFR 122.41(a))

6.2 <u>Duty to Reapply</u>

If the Permittee wishes to continue an activity regulated by this permit after the expiration date of this permit, it must apply for and obtain a new permit. The Permittee shall submit a new application at least 270 days before the expiration date of this permit unless permission for a later date has been granted by the Regional Administrator. (The Regional Administrator shall not grant permission for applications to be submitted later than the expiration date of the existing permit.) (40 CFR § 122.41(b))

6.3 Need to Halt or Reduce Activity not a Defense

It shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit. (40 CFR § 122.41(c))

6.4 <u>Duty to Mitigate</u>

The Permittee shall take all reasonable steps to minimize or prevent any discharge or disposal in violation of this permit which has a reasonable likelihood of adversely affecting human health or the environment. (40 CFR § 122.41(d))

6.5 Proper Operation and Maintenance

The Permittee shall at all times properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed or used by the Permittee to achieve compliance with the conditions of this permit. Proper operation and maintenance also includes adequate laboratory controls and appropriate quality assurance procedures. This provision requires the operation of back-up or auxiliary facilities or similar systems which are installed by a permittee only when the operation is necessary to achieve compliance with the conditions of the permit. (40 CFR § 122.41(e))

6.6 <u>Permit Actions</u>

This permit may be modified, revoked and reissued, or terminated for cause. The filing of a request by the Permittee for a permit modification, revocation and reissuance, or termination, or a notification of planned changes or anticipated noncompliance, does not stay any permit condition. (40 CFR §122.41(f))

6.7 <u>Property Rights</u>

This permit does not convey any property rights of any sort, or any exclusive privileges. (40 CFR § 1224.41(g))

6.8 <u>Duty to Provide Information</u>

The Permittee shall furnish to the Regional Administrator, within a reasonable time, any information which the Regional Administrator may request to determine whether cause exists for modifying, revoking and reissuing, or terminating this permit, or to determine compliance with this permit. The Permittee shall also furnish to the Regional Administrator, upon request, copies of records required to be kept by this permit. (40 CFR § 122.41(h))

6.9 Inspection and Entry

The Permittee shall allow the Regional Administrator, or an authorized representative (including an authorized contractor acting as a representative of the Regional Administrator), upon presentation of credentials and other documents as may be required by law, to:

- 1. Enter upon the Permittee's premises where a regulated facility or activity is located or conducted, or where records are kept under the conditions of this permit;
- 2. Have access to and copy, at reasonable times, any records that must be maintained under the conditions of this permit;

- Inspect at reasonable times any facilities, equipment (including monitoring and control equipment), practices, or operations regulated or required under this permit; and
- 4. Sample or monitor at reasonable times, for the purpose of assuring permit compliance or as otherwise authorized by the CWA, any substances or parameters at any location.

(40 CFR § 122.41(i))

6.10 Monitoring and Records

- 6.10.1 Samples and measurements taken for the purpose of monitoring shall be representative of the monitored activity.
- 6.10.2 The Permittee shall retain records of all monitoring information, including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation, copies of all reports required by this permit, and records of all data used to complete the application for this permit, for a period of at least three (3) years from the date of the sample, measurement, report or application. This period may be extended by request of the Regional Administrator at any time.
 - 6.10.3 Records of monitoring information shall include:
 - a. The date, exact place, and time of sampling or measurements;
 - b. The individual(s) who performed the sampling or measurements;
 - c. The date(s) analyses were performed;
 - d. The individual(s) who performed the analyses;
 - e. The analytical techniques or methods used; and
 - f. The results of such analyses.
- 6.10.4 Monitoring must be conducted according to test procedures approved under 40 CFR Part 136 unless another method is required under 40 CFR Subchapters N or OI.
- 6.10.5 The CWA provides that any person who falsifies, tampers with, or knowingly renders inaccurate any monitoring device or method required to be maintained under this permit shall, upon conviction, be punished by a fine or by imprisonment, or both. (40 CFR § 122.41(j))

6.11 Signatory Requirement

6.11.1 All applications, reports, and information submitted to EPA shall be signed and certified. (See 40 CFR § 122.22)

6.11.2 The CWA provides that any person who knowingly makes any false statement, representation, or certification in any record or other document submitted or required to be maintained under this permit, including monitoring reports or reports of compliance or non-compliance shall, upon conviction, be punished by a fine or by imprisonment, or both.

(40 CFR § 122.41(k))

6.11.3 *Certification*. Any person signing a document required by this Permit shall make the following certification:

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

6.12 Reporting Requirements

- 6.12.1 Anticipated non-compliance. The Permittee shall give advance notice to the Regional Administrator of any planned changes in the permitted facility or activity which may result in non-compliance with permit requirements. (40 CFR § 122.41(I)(2))
- 6.12.2 *Transfers.* This permit is not transferable to any person except after notice to the Regional Administrator. The Regional Administrator may require modification or revocation and reissuance of the permit to change the name of the permittee and incorporate such other requirements as may be necessary under the CWA. (40 CFR § 122.41(I)(3))
- 6.12.3 *Monitoring reports.* Monitoring results shall be reported at the intervals specified elsewhere in this permit. (40 CFR § 122.41(I)(4))
- 6.12.4 Compliance schedules. Reports of compliance or non-compliance with, or any progress reports on, interim and final requirements contained in any compliance schedule of this permit shall be submitted no later than 14 days following each schedule date. (40 CFR § 122.41(I)(5))

6.12.5 Twenty-four hour reporting.

6.12.5.1 The Permittee shall report any non-compliance which may endanger health or the environment. Any information shall be provided orally within 24 hours from the time the Permittee becomes aware of the circumstances.

A written report shall also be provided within 5 days of the time the Permittee becomes aware of the circumstances. The report shall be submitted electronically via email and shall contain a description of the non-compliance and its cause; the period of non-compliance, including exact dates and times, and if the non-compliance has not been corrected, the anticipated time it is expected to continue; and steps taken or planned to reduce, eliminate, and prevent reoccurrence of the non-compliance.

For non-compliance events related to combined sewer overflows, sanitary sewer overflows, or bypass events, these reports must include the data described above (with the exception of time of discovery) as well as the type of event (combined sewer overflows, sanitary sewer overflows, or bypass events), type of sewer overflow structure (e.g., manhole, combine sewer overflow outfall), discharge volumes untreated by the treatment works treating domestic sewage, types of human health and environmental impacts of the sewer overflow event, and whether the non-compliance was related to wet weather. All reports related to combined sewer overflows, sanitary sewer overflows, or bypass events submitted in compliance with this section must be submitted electronically by the Permittee to the Regional Administrator or initial recipient, as defined in 40 C.F.R. § 127.2(b), in compliance with this section and 40 C.F.R. Part 3 (including, in all cases, subpart D to Part 3), § 122.22, and 40 C.F.R. Part 127. Part 127 is not intended to undo existing requirements for electronic reporting. Independent of Part 127, the Permittee may be required to electronically submit reports related to combined sewer overflows, sanitary sewer overflows, or bypass events under this section by a particular permit or if required to do so by state law. The Regional Administrator may also require the Permittee to electronically submit reports not related to combined sewer overflows, sanitary sewer overflows, or bypass events under this section.

- 6.12.5.2 The following shall be included as information which must be reported within 24 hours under this paragraph.
 - i. Any unanticipated bypass which exceeds any effluent limitation in the permit. (See 40 C.F.R. § 122.44(g))
 - ii. Any upset which exceeds any effluent limitation in the permit.
 - iii. Violation of a maximum daily discharge limitation for any of the pollutants listed by the Director in the permit to be reported within 24 hours. (See 40 C.F.R. § 122.44(g))

The Regional Administrator may waive the written report on a case-by-case basis for reports under Subsection 6.12.5 of this permit if the oral report has been received within 24 hours. (40 CFR § 122.41(I)(6))

6.12.6 *Electronic reporting*. The Permittee shall electronically submit the required NPDES information (as specified in Appendix A to 40 C.F.R. Part 127) to EPA Region III as specified in Part 5 of this permit. For all documents required by this Permit that are submitted electronically, any person providing the electronic signature for such documents shall ensure that all relevant

requirements of 40 C.F.R. Part 3 (including, in all cases, subpart D to part 3) (Cross-Media Electronic Reporting); 40 C.F.R. § 122.2; and 40 C.F.R. Part 127 (NPDES Electronic Reporting Requirements) are met for that submission.

6.13 Upset

- 6.13.1 *Definition.* Upset means an exceptional incident in which there is unintentional and temporary non-compliance with technology-based permit effluent limitations because of factors beyond the reasonable control of the Permittee. An upset does not include non-compliance to the extent caused by operational error, improperly designed treatment facilities, inadequate treatment facilities, lack of preventive maintenance, or careless or improper operation.
- 6.13.2 Effect of an upset. An upset constitutes an affirmative defense to an action brought for non-compliance with such technology-based permit effluent limitations if the conditions of Subsection 6.13.3 of this permit are met. No determination made during administrative review of claims that non-compliance was caused by upset, and before an action for non-compliance, is final administrative action subject to judicial review.
- 6.13.3 Conditions necessary for a demonstration of upset. A Permittee who wishes to establish the affirmative defense of upset shall demonstrate, through properly signed, contemporaneous operating logs or other relevant evidence, that:
 - a. An upset occurred and that the Permittee can identify the cause(s) of the upset;
 - b. The permitted facility was at the time being properly operated;
 - c. The Permittee submitted notice of the upset as required in Section 6.12.5 (24-hour reporting); and
 - d. The Permittee complied with any remedial measures required by 40 C.F.R. § 122.41(d).
- 6.13.4 Burden of proof. In any enforcement proceeding the Permittee seeking to establish the occurrence of an upset has the burden of proof. (40 CFR § 122.41(n))

Part 7. OTHER REQUIREMENTS

7.1 National Historic Preservation Act of 1966, 54 U.S.C. §§ 300101 et seq.

Consultation with the District of Columbia State Historic Preservation Officer (DC SHPO) in accordance with Section 106 of the National Historic Preservation Act and its implementing regulations at 36 C.F.R. Part 800 resulted in a determination that the activities required by the permit will have no adverse effect on historic properties provided that the following conditions are met:

- a. All of the projects undertaken pursuant to the permit will be subject to review by the DC SHPO as part of the local historic preservation review process revised in accordance with any DC SHPO and/or DC Historic Preservation Review Board comments, as applicable, pursuant to local DC historic preservation legislation;
- b. The Permittee will ensure that, for any projects that it intends to implement directly, it will coordinate early with the DC SHPO and revise those projects as necessary to avoid adverse effects on historic properties; and
- c. EPA and the Permittee will consult with the DC SHPO pursuant to 36 C.F.R. Part 800 if requested by the DC SHPO, especially for any projects involving adverse effects on historic properties that are of particular concern to the DC SHPO.

If an alternate Historic Preservation procedure is approved by EPA in writing during the term of this permit, the alternate procedure will become effective after its approval.

7.2 <u>Endangered Species Act, 16 U.S.C. Chapter 35</u>

Per the requirements under Section 7 of the Endangered Species Act (50 C.F.R. Part 402; 16 U.S.C. § 1536(c)), EPA submitted a Biological Evaluation to the U.S. Fish and Wildlife Service (FWS) and The National Oceanic and Atmospheric Administration National Marine Fisheries Service (NOAA Fisheries). As a result of this consultation, NOAA Fisheries concurred with EPA's conclusion that the proposed permit is not likely to adversely affect any ESA listed species and/or designated critical habitat. Additionally, FWS concurred with EPA's determination that the proposed permit will have no effect on the long-eared bat and is not likely to adversely affect the Hay's spring amphipod.

7.3 Environmental Justice Considerations

- 7.3.1 The Permittee shall incorporate the findings of its BMP distribution analysis as one of the criteria for use in ranking projects for future implementation. These areas should be targeted for the projects/activities that are required by Section 3.2.11.
- 7.3.2 The Permittee shall develop a strategy by December 1, 2027, to support diversity, equity, inclusion, and justice into Clean Water Act objectives in the MS4 Permit Area. Some examples of the types of activities for the strategy may include:
 - a) Incentives for implementation of voluntary BMPs in high Demographic Index areas
 - b) Targeted outreach in underserved communities, including multi-lingual outreach/educational materials
 - c) Priority for studies/projects required by the MS4 permit in underserved communities/areas

Part 8. PERMIT DEFINITIONS

Terms that are not defined in this Part 8 shall have the meaning accorded them with precedence according to the following authorities in the order listed: section 502 of the Clean Water Act, 33 U.S.C. §§ 1251 et seq.; Clean Water Act implementing regulations, 40 C.F.R. Part 122; or as in common usage.

"Acres Managed" is the metric established for this permit to measure and track implementation of stormwater control measures. One "Acre Managed" is one acre of land treated by stormwater control measures to the applicable standard established in the Permittee's stormwater regulations or consistent with the relevant voluntary program. The basis for this metric is established for measures that provide on-site retention for a given drainage area, standardized by acres. However, not all stormwater control measures provide on-site retention; therefore, where equivalencies can be established for other types of stormwater control measures, those outcomes may be converted to "Acres Managed", per Subsection 2.5.2 of this permit.

Example 1: A development project required to meet the 1.2-inch retention standard for Development and Redevelopment $\geq 5,000$ square feet (Subsection 3.2.2) implements 1.2 inches of retention across 5 acres, through any combination of on-site and/or off-site retention controls = five (5) "acres managed".

Example 2: A Public Right-of-Way Project subject to the District's "MEP" process (Subsection 3.2.4) implements 1.8 inches of on-site retention across 2 acres = two (2) "acres managed".

Example 3: A Public Right-of-Way Project subject to the District's "MEP" process (Subsection 3.2.4) implements 0.9 inches of on-site retention across 2 acres = two (2) "acres managed".

Example 4: A redevelopment project required to meet the 0.8-inch on-site retention standard for Substantial Improvement Projects (Subsection 3.2.5) across one half-acre, through any combination of on-site and off-site retention controls = one half (0.5) "acre managed".

Example 5: A homeowner voluntarily implementing porous pavement through the District's RiverSmart Homes Program (Subsection 3.2.10) achieves 0.6 inches of on-site retention across one quarter acre = one quarter (1/4) "acre managed".

"Annual Report" refers to the report that the Permittee is required to submit annually pursuant to Section 5.2 of this permit.

"Benchmark" as used in this permit is a quantifiable goal or target to be used to assess progress toward "milestones" (see separate definition) and WLAs, such as a numeric goal for stormwater

control measure implementation. If a benchmark is not met, the Permittee should take appropriate corrective action to improve progress toward meeting milestones or other objectives. Benchmarks are intended as an adaptive management aid and generally are not considered to be enforceable.

"Consolidated TMDL Implementation Plan" is the ongoing and adaptive management strategy, initially required by the District's 2011 MS4 permit, that describes stormwater control measures and timelines for all TMDLs that include WLAs to the District MS4.

"Conveyance System Piping Infrastructure" refers to the portion of the MS4 that is made up of pipes typically located underground to convey stormwater. This term does not include storm drains, catch basins, swales, retention practices, or outfalls.

"Critical Sources" are those activities and operations that make, use, store, transport or dispose of materials or substances that have the potential to become pollutants in stormwater discharges, specifically:

- a. Commercial vehicular service activities, *e.g.*, washing, maintenance and fueling, including mobile operations.
- b. Dry cleaners.
- c. Aircraft or ship/boat maintenance and fueling activities.
- d. Facilities conducting industrial activities, as defined at 40 C.F.R. § 122.26(b)(14), except for 40 C.F.R. § 122.26(b)(14)(x).
- e. Facilities utilizing any material designated as a Hazardous Substance pursuant to 40 C.F.R. Part 116, in quantities exposed to stormwater that could cause or contribute to an exceedance of water quality standards or a water quality impairment.

"CWA" means Clean Water Act (formerly referred to as the Federal Water Pollution Control Act or Federal Water Pollution Control Act Amendments of 1972), 33 U.S.C. §§ 1251 et seq. "Director" means the Regional Administrator of EPA or an authorized representative.

"Discharge" for the purpose of this permit, unless indicated otherwise, refers to discharges to, from or through the Municipal Separate Storm Sewer System (MS4).

"Discharge Monitoring Report (DMR)" is the reporting system and format for providing monitoring data to EPA.

"EPA" means the U.S. Environmental Protection Agency Region III.

"Green Area Ratio Program" is the landscaping program codified in District zoning regulations (Title 11 DCMR) Chapter 34, to increase the quantity and quality of environmental performance of the urban landscape.

"Green Roof" is a roof system that stores rainwater where the water is taken up by plants and/or transpired into the air.

"Green Technology Practices" means stormwater control measures that are used to mimic predevelopment site hydrology by using site design techniques that retain stormwater on-site through infiltration, evapotranspiration, harvest and use.

"Guidance" means assistance in achieving a particular outcome or objective.

"Illicit connection" means any man-made conveyance connecting an illicit discharge directly to the MS4.

"Illicit discharge" means any discharge to the MS4 that is not composed entirely of stormwater except discharges pursuant to an NPDES permit (other than the NPDES permit for discharges from the MS4) or applicable District regulation and discharges resulting from firefighting activities, pursuant to 40 C.F.R. § 122.26(b)(2), except as provided for in Section 1.3 of this permit.

"Maryland Biological Stream Survey (MBSS)" is the Maryland Department of Natural Resources program and set of protocols for assessing and evaluating ecological resources in Maryland's streams and rivers.

"Maximum Extent Practicable" is an iterative standard applied by the permitting authority upon the issuance or reissuance of an MS4 permit, to optimize permit conditions in such a way as to balance water quality objectives with implementation feasibility. Permit requirements are meant to be robust and challenging, but still technically and economically practicable. See 64 Fed. Reg. 68754 (Dec. 8, 1999).

"Milestone" as used in this permit is an interim step toward attainment of a WLA that upon incorporation into the permit will become an enforceable limit or requirement to be achieved by a stated date. A milestone should be expressed in numeric terms, i.e. as a volume reduction, pollutant load, specified implementation action or set of actions or other objective metric, when possible and appropriate.

"MS4" or "Municipal Separate Storm Sewer System" means a conveyance or system of conveyances (including roads with drainage systems, municipal streets, catch basins, curbs, gutters, ditches, man-made channels, or storm drains):

(i) Owned or operated by a State, city, town, borough, county, parish, district, association, or other public body (created by or pursuant to State law) having jurisdiction over disposal of sewage, industrial wastes, storm water, or other wastes, including special districts under State law such as a sewer district, flood control district or drainage district, or similar entity, or an Indian tribe or an authorized Indian tribal organization, or a designated and approved management agency under section 208 of the CWA that discharges to waters of the United States;

- (ii) Designed or used for collecting or conveying storm water;
- (iii) Which is not a combined sewer; and
- (iv) Which is not part of a Publicly Owned Treatment Works (POTW) as defined at 40 C.F.R. § 122.2.

"On-Site Retention" means the use of soils, vegetation, water harvesting and other mechanisms and practices to retain a target volume of stormwater on a given site through the functions of: pore space and surface ponding storage; infiltration; reuse; and/or evapotranspiration.

"Performance standard" means, for purposes of this permit, a measure or provision for attainment of an outcome or objective.

"Permittee" is the Government of the District of Columbia.

"Programmatic Indicators" are metrics to evaluate specific aspects of program implementation such as numbers/types of control measures installed, number of inspections performed, or number of illicit connections identified and corrected.

"Public Right-of-Way (PROW)" is the surface, the air space above the surface (including air space immediately adjacent to a private structure located on public space or in a PROW), and the area below the surface of any public street, bridge, tunnel, highway, railway track, lane, path, alley, sidewalk, or boulevard, where a property line is the line delineating the boundaries of public space and private property.

"RiverSmart" is a series of District programs that facilitates the implementation of voluntary stormwater management measures. For more information see: http://doee.dc.gov/service/get-riversmart.

"Stormwater" means storm water runoff, snow melt runoff, and surface runoff and drainage.

"Stormwater Control Measure" or Control Measure is a management practice, structure or policy that captures, diverts or manages the volume of stormwater or minimizes or eliminates the concentrations of pollutants in stormwater discharges.

"Stormwater Retention Credit (SRC)" is one gallon of retention capacity for one year, as certified by the District Department of Environment and Energy.

"Stormwater Management Program (SWMP)" is a multi-faceted program that includes all activities to meet the requirements of the permit to prevent and mitigate the effects of stormwater discharges via the MS4 on the physical, chemical, and biological integrity of receiving waters.

"Stormwater Management Program (SWMP) Plan" is the collection of all strategies, plans and schedules that describe and document the SWMP.

"Stormwater Retention Volume (SWRv)" is the volume of stormwater from a site for which the site is required to achieve retention.

"TMDL" or "Total Maximum Daily Load" means the calculation of the maximum amount of a particular pollutant that a waterbody can assimilate and still meet applicable water quality standards, factoring in seasonal variation and a margin of safety. A TMDL may be broken down into aggregate and/or individual wasteload allocations and load allocations. See 40 C.F.R. §§ 130.2, 130.7.

"Wasteload Allocation" means the portion of a receiving water's loading capacity that is allocated to one or more of its existing or future point sources in a TMDL. See 40 C.F.R. § 130.2.

"Water quality standards" refers to the District of Columbia's Surface and Ground Water Quality Standards codified at Code of District of Columbia Regulations §§ 21-1100 et seq., which are effective on the date of issuance of the permit and any subsequent amendments that may be adopted and approved during the life of this permit.

"Waters of the United States" is defined at 40 C.F.R. § 122.2.

"Watershed Indicators" are metrics used to evaluate specific aspects of ecological health, such as macroinvertebrate community diversity, geomorphological indices, or water quality data.

APPENDIX A

Annual Report Template